Monitoring Data Record

Project Title: R-3427 (US 601 Widening)	COE Action ID: 200421361 & 200421362
Stream Name: UT Dry Branch (Site 6)	
City, County and other Location Information: US 601, Yadkin County (64+20-66+08)	
Date Construction Completed: Water turned 7-	
Monitoring Year: (5) of 5	•
	git HUC unit03040101
USGS Quad Name and Coordinates:	
Rosgen Classification:	
Length of Project: 220' Urban or Rural:	Rural Watershed Size:
Monitoring DATA collected by: J. Young and J.	
Applicant Information:	
Name: NCDOT Roadside Environmenta	l Unit
Address: 1425 Rock Quarry Road Ral	eigh, NC 27610
Telephone Number: (919) 861-3772	Email address: mlgreen@ncdot.gov
Consultant Information:	
Name:	
Address:	
Telephone Number:	Email address:
Project Status: <u>Complete</u>	
Monitoring Level required by COE and DWQ	
Monitoring Level 1 requires completion of Section 2	
	owing components of Level I monitoring twice
	summer and winter): Reference photos, plant
<u> </u>	ty. If less than two bankfull events occur during
	nonitoring until the second bankfull event is
	iring separate monitoring years. In the event that
	g the 5 year monitoring period, the USACE, in
consultation with resource agencies, may determ	ine that further monitoring is not required.
Section 1. PHOTO REFERENCE SITES	
(Monitoring at all levels must complete this section)	
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Total number of reference photo locations at	this site:
Total number of reference photo locations at a A total of 8 photos were taken from 3 photo p	
A total of 8 photos were taken from 3 photo p	oint locations.
A total of 8 photos were taken from 3 photo p Dates reference photos have been taken at thi	oint locations. s site: <u>1/6/07, 8/22/07, 1/30/08, 5/28/08,</u>
A total of 8 photos were taken from 3 photo p	oint locations. s site: <u>1/6/07, 8/22/07, 1/30/08, 5/28/08,</u>
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A total of 8 photos were taken from 3 photo p Dates reference photos have been taken at thi	oint locations. s site: <u>1/6/07, 8/22/07, 1/30/08, 5/28/08,</u> 1
A total of 8 photos were taken from 3 photo p Dates reference photos have been taken at thi 1/13/09, 6/23/09, 3/9/10, 6/2/10, 1/31/11, 8/16/1	oint locations. s site: <u>1/6/07</u> , <u>8/22/07</u> , <u>1/30/08</u> , <u>5/28/08</u> , 1
A total of 8 photos were taken from 3 photo p Dates reference photos have been taken at thi 1/13/09, 6/23/09, 3/9/10, 6/2/10, 1/31/11, 8/16/1	oint locations. s site: 1/6/07, 8/22/07, 1/30/08, 5/28/08, 1 be obtained (name, address, phone):
A total of 8 photos were taken from 3 photo p Dates reference photos have been taken at thi 1/13/09, 6/23/09, 3/9/10, 6/2/10, 1/31/11, 8/16/1 Individual from whom additional photos can	oint locations. s site: 1/6/07, 8/22/07, 1/30/08, 5/28/08, 1 be obtained (name, address, phone):

If required to complete Level 3 monitoring <u>only</u> stop here; otherwise, complete section 2.

Section 2. <u>PLANT SURVIVAL</u> Attach plan sheet indicating reference photos.

Identify specific problem areas (missing, stressed, damaged or dead plantings): Small pockets of kudzu still exist along roadway shoulder.
Estimated causes and proposed/required remedial action: <u>Division Roadside sprayed the kudzu during</u> the summer of 2010. Division Roadside will continue to treat the kudzu in 2011.

ADDITIONAL COMMENTS: <u>Planted vegetation is surviving</u>. <u>Planted vegetation includes black willow</u>, silky dogwood, green ash, river birch, and sycamore. Other vegetation noted on site includes: sweetgum, pine, fennel, briars, alder, red maple, sedge, goldenrod, woolgrass, *Juncus* sp., *Sagittaria* sp., cattail, kudzu, poplar, and various grasses. NCDOT proposes to discontinue plant survival monitoring at this stream relocation.

If required to complete Level 1 and Level 2 monitoring only stop here; otherwise, complete section 3.

Section 3. CHANNEL STABILITY

Visual Inspection: The entire stream project as well as each in-stream structure and bank stabilization/revetment structure must be evaluated and problems addressed.

Report on the visual inspection of channel stability. <u>Physical measurements of channel stability/morphology will not be required.</u> Include a discussion of any deviations from as-built and an evaluation of the significance of these deviations and whether they are indicative of a stabilizing or destabilizing situation.

Stream is highly stabilized for the Year 5 Summer evaluation. All cross vanes are functioning properly and streambanks are stabilized with woody and herbaceous vegetation. A beaver dam was noted downstream of Photo Point #3 @ STA.64+60-L- RT. NCDOT has breached the beaver dam and has contacted the USDA to remove the beaver onsite. Throughout the 5-year monitoring period NCDOT visually noted 3 bankfull events in January 2007, March 2010, and January 2011. NCDOT proposes to discontinue channel stability monitoring at this stream relocation.

Date STA 64+60-Station Station Station Station Inspected L- RT. Number Number Number Number (PP#3 Downstream) Structure Type Is water piping through or around structure? Head cut or down cut present? Bank or scour erosion present? Other Beaver Dam problems noted?

Section 4. DEBIT LEDGER

The entire UT Dry Branch stream mitigation site was used for the R-3427 project to compensate for unavoidable stream impacts.

UT Dry Branch



Photo Point #1 (Upstream)



Photo Point #1 (Downstream)



Photo Point #2 (Upstream)



Photo Point #2 (Downstream)



Photo Point #3 (Upstream)



Photo Point #3 (Downstream)

UT Dry Branch



Photo Point #3 (Buffer Area)



Photo Point #3 (Buffer Area)

Year 5 Summer – August 2011

